

Tom/Yvonne

STATE OF MISSOURI  
**DEPARTMENT OF NATURAL RESOURCES**

Mel Carnahan, Governor • David A. Shott, Director

DIVISION OF ENVIRONMENTAL QUALITY  
P.O. Box 176 Jefferson City, MO 65102-0176

April 22, 1996

Mr. Jerry Van Fossen  
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Weldon Spring Site Remedial Action Project  
7295 Highway 94 South  
St. Charles, Missouri 63304

SUBJECT: Comments on the Draft Engineering Evaluation/Cost  
Analysis (EE/CA) for the Proposed Removal Action at the  
Southeast Drainage near the Weldon Spring Site, March  
1996

Dear Mr. Van Fossen:

This letter is in response to the draft EE/CA for the Southeast Drainage which was received by the MDNR on March 19, 1996. The MDNR staff and their support agencies have reviewed this document. The March 1996 edition of this document is the second draft which the MDNR staff has reviewed. Although the DOE/PMC has addressed comments which were identified by the MDNR during the review of the initial draft (October 1995), several key issues remain. These five issues are discussed below and are followed by a list of the comments from the MDNR's initial review letter dated December 29, 1995, which pertain to these issues and need to be satisfactorily addressed.

1. As noted in the MDNR's comment letter of December 29, 1995, and discussed with DOE/PMC staff on March 29, 1996, the soils characterization data collected by the PMC during the December 1995 sampling effort needs to be included in the EE/CA to provide a more thorough understanding of the situation in the drainage and the remediation measures proposed.

The data currently included in the EE/CA does not address if contamination exists on the ballast of the KATY Trail State Park or if the ENTIRE length of the Drainage was characterized (i.e. the portion of the drainage between the KATY Trail and its confluence with the Missouri River does not appear to have been characterized). As requested by Division of State Parks staff during the January 23, 1996, meeting between the DOE, MDNR, MDOC, and the St. Charles Citizens Commission regarding this draft of the EE/CA,

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characterization of the ballast is needed to determine if Trail visitors are being exposed and to insure that all materials in the Drainage which pose an unacceptable risk are removed in one efficient removal action. (Refer to comments 1b and 13 of the MDNR December comment letter.)

2. The EE/CA states that, "calculated risk-based concentrations" were derived. Clarification is needed as to how these concentrations will "guide" cleanup activities. What is the difference between concentrations that guide clean-up activities and "soil clean-up concentrations"? Will these concentrations be utilized for both surface and subsurface soils? (Refer to comment 23c of the MDNR December comment letter.)
3. As discussed during meetings held between the MDNR and DOE staffs on January 23, February 16, and March 15, 1996, a mass balance of water into and out of the watershed is needed. This mass balance would further define the connection between the groundwater and surface water and the influence of the contaminated sediments on the surface water. The characteristics of the watershed and the factors controlling erosion in this drainage is also needed to be able to determine the fate and transport of remaining contaminants and to determine erosion control devices to be utilized during remediation. (Refer to comments 1d, 3b, 7a, 7c, and 13 of the MDNR December comment letter.)
4. The EE/CA does not address current or future (if the proposed removal action is instituted) risks to the environmental. Section 2.3.4 of the report addresses ecological risks however this assessment is based solely on aquatic organisms and did not include an assessment of the risks to other animal life (such as mammals). An assessment to determine the risks to other animals is needed to provide a complete and thorough understanding of the proposed removal action and its affects. (Refer to comment 1g of the MDNR December comment letter.)
5. In a letter dated February 13, 1996, the DOE responded to the MDNR December comment letter regarding the EE/CA. Several of these responses need to be included in the EE/CA document and/or need to be revised in order to specifically address the MDNR comment or to provide further detail. These include the responses to the following comments from the MDNR

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December comment letter: 1c, 1h, 1i, 5a, 7c, 8, 11, 12, and 16. In addition, comments regarding the new or revised sections of the EE/CA are noted below.

6. Pg. 35, Section 4.1.4 - How will trees, root balls, and vegetation from contaminated areas be managed?

The DOE needs to be aware of and take precautions against flooding or siltation of the KATY Trail during remediation. This is of special concern as the existing schedule indicates that the removal action will take place during the early summer months, a time when the Trail is heavily utilized.

7. Pg. 36, Section 4.2 - A definition is needed of "elevated levels of contaminants". How will areas which cannot be reached or removed by track vehicles be managed?
8. Pg. 38, Section 4.2 - The statement "would involve removal of all sediment locations" needs to be revised to read, "removal of all contaminated sediment/soil locations".
9. Pg. 39, Section 5.1 - A definition is needed of "administrative feasibility".
10. Pg. 40, Section 5.1.2.1 - This alternative does not address removing contaminated sediments in all segments of the drainage as it does not include those contaminated soils/sediments in the upper reaches of segment A. Clarify in the test as to which quarry haul road will be utilized for this subalternative. Will repairs need to be made to the Hamburg Quarry haul road prior to its use during the Drainage's remediation? Do the costs included for each subalternative include activities to repair the drainage to natural conditions following removal actions?
11. Pg. 43, Table 10 - A residential scenario is possible in Segment A of the Drainage. How does the post-remedial risk listed for Subalternative 2.3 compare with the risk that would be associated with an unrestricted, residential use scenario?
12. Pg. 44, Section 6 - A definition is needed to the stability testing previously performed for related wastes.

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A definition is needed of the "existing materials" which will be utilized to construct the two haul routes. Will contamination which is present under areas slated to be used for road construction be removed prior to building or after haul roads have been utilized? Will the ramp into the north end of Segment B remain following remediation of the Drainage?

13. Pg. 45, Section 6 - What would determine if the light grey aggregate is reused, disposed or used as backfill grading in the excavated areas?

Will more than one crossing be utilized at the intersection of Hwy 94 and the haul road? Has the MHTD consented to providing traffic control?

14. Pg. 46, Section 6 - What types of barriers would be erected on the drainage access routes?

A definition of "minimal backfilling" is needed.

The possibility of this action requiring a land disturbance permit still exists. Obtaining approval from the St. Charles County Highway engineer does not exempt the DOE from applying for and receiving a land disturbance permit. Approval from the local agencies is a prerequisite for submitting an application to the MDNR for a land disturbance permit. Please contact Richard Laux with the WPCP for additional language needed in the EE/CA and Appendix B to clarify the ARARs needed for this action.

The MDNR staff has presented a briefing to Department management regarding the proposed EE/CA and the limited use, risk-based scenario upon which the proposed remediation has been based. As discussed during the April 12, 1996, meeting between the DOE and MDNR staffs, MDNR management has several requests regarding this proposal. These are as follows:

1. Submittal of all field and analytical data which has been generated from all characterizations and investigations of the Drainage.
2. Determine if contaminated materials exist on the KATY Trail ballast, the extent of any contamination, and how these materials would be managed.

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3. Dates as to when the upgradient contaminated areas which drain to the Southeast Drainage will be remediated. A rationale or explanation by the DOE if these areas are

scheduled to be remediated after the Drainage, thereby causing the possibility of recontamination of the Drainage.

4. A comparison of the volume of contaminated soils, costs, and ecological damage of the limited use, risk-based scenario to a risk assessment based on remediating the Drainage to unrestricted residential use.

Once this information is officially conveyed by the DOE to the MDNR, consideration of the proposed EE/CA will continue. Should you have any questions or need clarifications concerning these issues, please contact the MDNR Field Office at (314) 441-8030.

Sincerely,

HAZARDOUS WASTE PROGRAM



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GNK

c: Dan Wall, EPA Region VII